

Amendments to the Claims

1-31 (Canceled)

32. (New) A method of preparing a cardio myopeptidin from hearts of healthy non-human mammals comprising the steps of:

- (a) cleaning and cutting the hearts of healthy non-human mammals;
- (b) homogenizing the hearts by adding sterile distilled water to the myocardium of the hearts of healthy non-human mammals which is cleaned and cut, thereby creating homogenate;
- (c) freezing and thawing the homogenate for at least 3 cycles;
- (d) heating the homogenate to 65 to 95°C;
- (e) filtering the homogenate using a plate-and-frame filter to obtain a coarse filtrate, and removing a residue resulting from the filtering;
- (f) ultra-filtering the coarse filtrate with a hollow-fiber column to obtain a fine filtrate having a molecular weight of less than 12000 Da;
- (g) ultra-filtering the fine filtrate using an ultrafiltration membrane to obtain the cardio myopeptidin solution with a molecular weight in the range from 2000 to 8000 Da; and
- (h) concentrating the cardio myopeptidin solution by reverse osmosis to obtain a concentrated cardio myopeptidin solution;
- (i) testing the quality of concentrated cardio myopeptidin solution; and,
- (j) filtering aseptically, filling, and lyophilizing the concentrated cardio myopeptidin to obtain a polypeptide comprising: 75% to 90% of peptide; 6% to 15% of free amino acid; less than 2% of ribonucleic acid; and, less than 7.5% of deoxyribonucleic acid, wherein the cardio

myopeptidin shows four to five principal peaks on an HPLC analysis spectrum, having a relative peak area of more than 85%.

33. (New) The method of claim 32 wherein a weight average of the molecular weight is in the range from 2000 to 5000 Da.

34. (New) The method of claim 32 wherein the non-human mammals is infant mammals comprising pigs, cattle, sheep, rabbits, or horses.

35. (New) The method of claim 32 wherein an isoelectrofocusing electrophoresis of the cardio myopeptidin displays 2 to 6 stained bands; wherein the cardio myopeptidin has a stable maximum absorption peak at 190 to 210 nm wavelength within a UV spectrum, and wherein the cardio myopeptidin shows five peaks on an FPLC analysis spectrum, with a sum of relative area from 90% to 95%.

36. (New) The method of claim 32 wherein the cardio myopeptidin shows five principal peaks on an HPLC analysis spectrum; the sum of the relative percentage of principal peaks 1, 4 and 5 is more than 66%, and the proportion of the relative retention time of principal peaks 1, 4 and 5 is 1:1.61:2.14 (± 0.1).

37. (New) The method of claim 32 wherein the sterile distilled water is added in an amount from 0.5 to 4 times that of the myocardium of the mammals, and wherein the step of homogenizing comprises rotating at a rotation speed in the range of from 1000 to 5000 rpm/min.

38. (New) The method of claim 32 wherein the freezing step is performed at a temperature of less than about -5°C for 24 to 72 hours; and wherein the heating step comprises water bath heating or direct heating at a temperature of 70 to 90°C for not more than 2 hours.

39. (New) A method of using the cardio myopeptidin prepared by the method of claim 32 comprising the step of preparing a medicament for the treatment of cardiovascular disease or myocardial ischemia-reperfusion injuries.